- 2. (Canceled)
- 3. (Canceled)
- 4. (Canceled)
- 5. (Original) A method of identifying a pathogen comprising the steps of:
  - a) contacting immature dendritic cells with a pathogen or immunogenic components thereof:
  - b) isolating and labeling mRNA from said dendritic cells;
  - c) detecting labeled mRNA from said dendritic cells such that a gene profile is produced; and
  - d) analyzing the gene profile relative to one or more reference gene profile(s) such that at least one stimulus-specific gene is identified thereby identifying a pathogen for which the stimulus-specific gene is specific.
- 6. (Currently Amended) A method of diagnosing infection in a mammal comprising the steps of:
  - a) b) isolating mRNA from one or more dendritic cells in a mammal;
  - b) contacting said mRNA with at least one stimulus-responsive gene probe wherein hybridization of a stimulus-responsive probe to said mRNA is indicative of infection in said mammal.
- 7. (Previously Presented) The method of Claim 6, wherein the stimulus-responsive gene probe is a stimulus-specific gene probe.
- 8. (Previously Presented) The method of Claim 6, wherein the stimulus-responsive gene probe is a common stimulus-responsive gene probe.
- 9. (Previously Presented) A method of diagnosing infection by a pathogen in a mammal comprising the steps of:

- a) isolating mRNA from one or more dendritic cells in a mammal;
- b) determining gene expression of at least one stimulus-specific gene, wherein expression of a stimulus-specific gene is indicative of infection by a pathogen to which the stimulus-specific gene is specific.
- 10. (Canceled)
- 11. (Canceled)
- 12. (Canceled)
- 13. (Canceled)
- 14. (Canceled)
- 15. (Canceled)
- 16. (Canceled)
- 17. (Canceled)
- 18. (Canceled)
- 19. (Canceled)
- 20. (Canceled)
- 21. (Canceled)
- 22. (Canceled)

- 23. (Canceled)
- 24. (Canceled)
- 25. (Canceled)
- 26. (Canceled)
- 27. (Canceled)
- 28. (Canceled)
- 29. (Canceled)
- 30. (Canceled)
- 31. (Canceled)
- 32. (Canceled)
- 33. (Canceled)
- 34. (Canceled)
- 35. (Canceled)
- 36. (Canceled)
- 37. (Canceled)
- 38. (Canceled)

| 39.         | (Canceled)  |
|-------------|---|
| 40.         | (Canceled)  |
| 41.         | (Canceled)  |
| 42.         | (Canceled)  |
| 43.         | (Canceled)  |
| 44.         | (Canceled)  |
| 45.         | (Canceled)  |
| 46.         | (Canceled)  |
| <b>4</b> 7. | (Canceled)  |
| 48.         | (Canceled)  |
| 49.         | (Canceled)  |
| 50.         | (Canceled)  |
| 51.         | <ul> <li>(Original) A method of identifying a pathogen comprising the steps of:</li> <li>a) contacting one or more immature dendritic cells with a stimulus;</li> <li>b) isolating mRNA from said dendritic cells; and</li> <li>c) determining a gene profile such that at least one stimulus-specific gene is identified thereby identifying a pathogen for which the stimulus-specific gene is</li> </ul> |
|             | specific.   |

- 52. (Canceled)
- 53. (Canceled)
- 54. (Canceled)
- 55. (Canceled)
- 56. (Canceled)
- 57. (Canceled)
- 58. (Canceled)